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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/809,323	03/26/2004	Tomoyoshi Mitsumoto	1110-0318P	1240
2292	7590	11/30/2005	EXAMINER	
BIRCH STEWART KOLASCH & BIRCH PO BOX 747 FALLS CHURCH, VA 22040-0747			LEE, SIN J	
			ART UNIT	PAPER NUMBER
			1752	
DATE MAILED: 11/30/2005				

Please find below and/or attached an Office communication concerning this application or proceeding.

# Office Action Summary

Application No.

10/809,323

Applicant(s)

MITSUMOTO ET AL.

Examiner

Sin J. Lee

Art Unit

1752

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

## Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

## Status

- 1) ☒ Responsive to communication(s) filed on 06 September 2005.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

## Disposition of Claims

- 4) ☒ Claim(s) 1,2 and 4-17 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☒ Claim(s) 13,15 and 17 is/are allowed.
- 6) ☒ Claim(s) 1,2 and 4-11 is/are rejected.
- 7) ☒ Claim(s) 12,14 and 16 is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

## Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
- Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

## Priority under 35 U.S.C. § 119

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All b) ☐ Some \* c) ☐ None of:
- 1) ☒ Certified copies of the priority documents have been received.
  - 2) ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
  - 3) ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

## Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☒ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)  
Paper No(s)/Mail Date 5/20/05, 7/25/05.
- 4) ☐ Interview Summary (PTO-413)  
Paper No(s)/Mail Date. \_\_\_\_\_.
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other: \_\_\_\_\_.

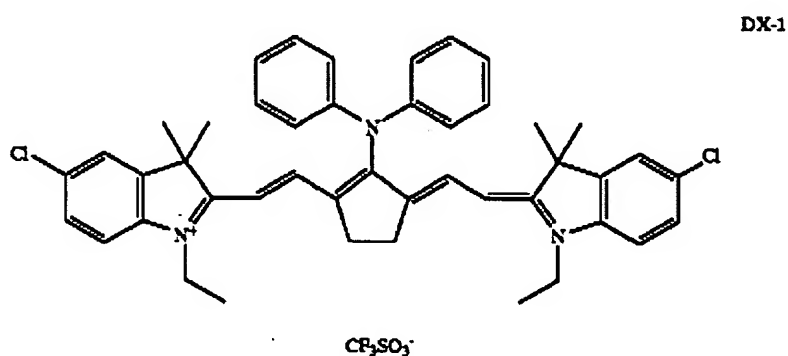
### DETAILED ACTION

1. Applicants canceled claim 3.
2. Due to newly cited prior arts, the following rejections are made non-final.

#### ***Claim Rejections - 35 USC § 102***

3. The text of those sections of Title 35, U.S. Code not included in this action can be found in a prior Office action.
4. Claims 1 and 2 are rejected under 35 U.S.C. 102(b) as being anticipated by Shimada et al (US 2003/0054288 A1).

In Example 25, Shimada teaches (see [0283]-[0287]) a planographic printing plate precursor, which comprises a substrate and a photosensitive layer, and the composition for the photosensitive layer contains a polymerization initiator (present component (B)), an addition-polymerizable compound (present component (C)), and a light-heat converting agent DX-1 of the following structure:



Shimada's compound DX-1 is also shown in present specification (pg.27) as one of preferred examples for the present compound (A). Therefore, the prior art teaches

present inventions of claims 1 and 2: Shimada states in [0210] that his printing plate precursor can be developed with *water* or an alkaline aqueous solution. Therefore, it is the Examiner's position that Shimada's photosensitive layer is *capable* of being removed with dampening water as presently recited.

***Claim Rejections - 35 USC § 103***

5. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

6. Claims 4-9 are rejected under 35 U.S.C. 103(a) as being unpatentable over Shimada et al (US 2003/0054288 A1) in view of Kawamura (US 6,599,674 B1).

Shimada is discussed above in Paragraph 4. Shimada does not teach present undercoat layer containing a compound having a polymerizable group on the molecule. Kawamura, which teaches a heat-sensitive lithographic printing plate, teaches the use of an organic undercoat layer containing a compound, which is obtained by the hydrolysis and polycondensation reaction of a silane coupling agent having at least one addition polymerizable functional group, in order to improve the adhesion of an image-forming layer to the support (see col.24, lines 13-67, col.25, lines 1-67). As one of examples for the silane coupling agent, Kawamura discloses  $\text{CH}_2=\text{CH}-\text{Si}(\text{OC}_2\text{H}_5)_3$ . Based on Kawamura's teaching, it would have been obvious to one skilled in the art to use an organic undercoat layer containing the compound obtained by the hydrolysis and polycondensation reaction of the silane coupling agent,  $\text{CH}_2=\text{CH}-\text{Si}(\text{OC}_2\text{H}_5)_3$ , in

Shimada's invention in order to improve the adhesion of Shimada's photosensitive layer and substrate. Therefore, Shimada in view of Kawamura render obvious present inventions of claims 4-9.

7. Claims 10 and 11 are rejected under 35 U.S.C. 103(a) as being unpatentable over Shimada et al (US 2003/0054288 A1) in view of Crutchfield et al (4,365,018).

Shimada is discussed above in Paragraph 4. Shimada does not teach present encapsulation of claims 10 and 11. However, it is well known in the art to physically separate reactants of a light sensitive imaging layer by encapsulating one of more of the reactants so as to prevent any chemical reactions among those reactants prior to an imaging step, as evidenced by Crutchfield, col.2, lines 24-44. Therefore, it would have been obvious to one skilled in the art to physically separate (by encapsulating) the components of Shimada's photosensitive layer in order to prevent the photopolymerization reaction among those components prior to the imaging step. Therefore, Shimada in view of Crutchfield render obvious present inventions of claims 10 and 11.

#### ***Allowable Subject Matter***

8. Claims 12, 14 and 16 are objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims. Claims 13, 15 and 17 are allowed. Shimada does not teach or suggest present step of claims 12 and 13 for supplying both an aqueous component and an oil-based ink to the exposed plate.

#### ***Response to Arguments***

9. Applicant's arguments filed September 6, 2005 have been fully considered but they are not persuasive. Applicants argue that in Shimada, it is a prerequisite to perform the wet development step using an alkaline developer, with the on-machine development with printing ink and /or dampening water being impossible. However, Shimada reference never states that the on-machine development with printing ink and/or dampening water is impossible. In fact, Shimada states in [0210] that his printing plate precursor can be developed with water (as well as with the alkaline aqueous solution). Therefore, it is the Examiner's position that Shimada's photosensitive layer is *capable* of being removed with dampening water as presently recited (present claim 1 is not a method claim, which states a positive step of performing the on-machine development with printing ink and/or dampening water) Applicants furthermore argue that the binder used in Shimada's Example 25 (ally methacrylate/methacrylic acid/N-isopropylamide copolymer) has a strong carboxyl group and is thus absorbed on the surface of the substrate, thus making it impossible to completely remove the unexposed areas of the photosensitive layer. However, *present specification* (see pg.78 and 79) *also lists (met)acrylic resins* (which clearly include the carboxyl group) as one of exemplary binders that can be used in the present invention (see also pg.81, lines 10-11 where binders having carboxyl group are said to be preferred).

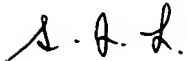
For the reasons stated above, present rejections as addressed above still stand.

10. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Sin J. Lee whose telephone number is 571-272-1333.

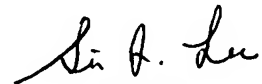
The examiner can normally be reached on Monday-Friday from 9:00 am EST to 5:30 pm EST.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Cynthia Kelly, can be reached on 571-272-1526. The fax phone number for the organization where this application or proceeding is assigned is **571-273-8300**.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).



S. Lee  
November 26, 2005



**SIN LEE**  
**PRIMARY EXAMINER**